



## I. Background<sup>2</sup>

### A. The Patents<sup>3</sup>

Broadly speaking, the Asserted Patents each disclose inventions that allow digital videos to be displayed using “trick modes” such as rewind, fast forward, or freeze frame.

#### 1. The ’752 Patent

Modern audiovisual data storage systems often store data in scrambled form so as to control access to the data, with the data unscrambled when the corresponding videos are viewed. ’752 Patent at 1:13-18; Am. Compl. ¶ 16. This approach creates a problem, however: trick modes require “access and fast decoding” of recorded audiovisual data, which “are difficult to make compatible with recording in scrambled mode.” ’752 Patent at 1:30-32. The “aim of the invention” claimed in the ’752 Patent is “to alleviate” these “drawbacks.” *Id.* at 1:36-37. Entitled “Process for Recording a Scrambled MPEG Stream,” *id.* at 1:1-2, the patent claims a process for recording audiovisual data so that it may later be read and displayed in a trick mode, *id.* at 1:38-46. As illustrated by the drawing included as Figure 1 of the patent, that process consists of six steps.<sup>4</sup> *See id.* fig. 1.

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<sup>2</sup> Because Defendant’s arguments for dismissal turn only on the validity of the Asserted Patents themselves, not on the sufficiency of Plaintiff’s allegations as to infringement, the Court provides background only as to the content of the Asserted Patents, not as to Defendant’s alleged infringement of them.

<sup>3</sup> The following facts, which are assumed true for purposes of this Opinion and Order, are taken from the Complaint and the exhibits appended thereto, including the Asserted Patents themselves. *See Interpharm, Inc. v. Wells Fargo Bank, Nat’l Ass’n*, 655 F.3d 136, 141 (2d Cir. 2011) (explaining that on a motion to dismiss pursuant to Rule 12(b)(6), the court must “assum[e] all facts alleged within the four corners of the complaint to be true, and draw[] all reasonable inferences in plaintiff’s favor”); *Chambers v. Time Warner, Inc.*, 282 F.3d 147, 153 (2d Cir. 2002) (“[O]n a motion to dismiss, a court may consider documents attached to the complaint as an exhibit or incorporated in it by reference . . . .” (internal quotation marks omitted)).

<sup>4</sup> The ’752 Patent in fact discloses two processes for recording scrambled audiovisual data in a format that allows it to be accessed and displayed in a trick mode. *Compare* ’752 Patent fig. 1 *with id.* fig. 2. Nonetheless, because this Opinion and Order will consider only claim one of the

In the first step, a stream of scrambled audiovisual data is filtered so as to extract the partial stream corresponding to the particular video that is to be recorded. *Id.* at 2:53-56. This partial stream is then processed in two different ways. *Id.* at 2:58-59. First, in what the patent terms the sixth step, the scrambled audiovisual stream is directly transmitted to a storage unit, where it is recorded in scrambled form. *Id.* at 2:61-62. Examples of such storage units include DVDs or hard drives. *Id.* at 5:40-41. Second, the scrambled audiovisual stream is further processed to extract the information necessary to display the video in a trick mode. *See id.* at 1:41-43. In what the patent terms the second step, the keys needed to descramble the scrambled audiovisual stream are first extracted from that stream and, if necessary, de-encrypted. *Id.* at 2:63-67. Then, in what the patent terms the third step, the video information is itself extracted from the stream and descrambled using the keys obtained during step two. *Id.* at 3:1-4. Next, in what the patent terms the fourth step, the information required to operate the various trick modes is extracted from the descrambled video. *Id.* at 3:14-17. That information may pertain to the size of video frames, their location in the stream, the type of the image, or other facts. *Id.* at 3:17-19. Lastly, in what the patent terms step five, a separate file is created containing the information necessary to display the video in a trick mode. *Id.* at 3:20-22. In step six, discussed above, this separate file is also recorded to accompany the recording of the scrambled audiovisual stream itself. *Id.* at 3:22-24, 28-29.

This process is claimed in claim one of the '752 Patent, which reads in full as follows:

A process for recording, on a recording medium, a scrambled digital video stream, implementing the following steps, in addition to the recording of the scrambled data:

descrambling of said scrambled data of said stream so as to extract therefrom additional data corresponding to information required by at least one function of the special mode or "trick mode" (fast forward, fast

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<sup>752</sup> Patent, *see supra* note 1, this summary explains only the process that is claimed in claim one, and omits the other process disclosed in the patent.

rewind, accelerated motion, slow motion, etc.); and recording of these additional data on the recording medium.

*Id.* at 6:51-58.

## 2. The '828 Patent

While the '752 Patent discloses processes for recording audiovisual data, the '828 Patent, which is entitled “Method for Discontinuous Transmission, in Sections, of Data in a Network of Distributed Stations, as Well as a Network Subscriber Station as a Requesting Appliance for Carrying Out a Method Such as This, and a Network Subscriber Station as a Source Appliance for Carrying Out a Method Such as This,” '828 Patent at 1:1-9, discloses a method of transmitting audiovisual data, *id.* at 1:17-18.<sup>5</sup> Like the '752 Patent, the '828 Patent addresses a problem that arises when displaying videos in trick modes. *Id.* at 2:28-32. Technology companies have developed standards for transmitting data among networked household appliances. *See generally id.* at 1:25-39. In the context of audiovisual data, such appliances could include DVD players, hard disk recorders, or CD players as the data source, *id.* at 4:11-14, and digital televisions as the data destination, *id.* at 4:24-27. One protocol that may be used for transmitting that data is the HTTP GET method. *Id.* at 1:48-52. That method was originally developed to transmit files, such as web pages, from an internet server to an internet browser. *Id.* at 1:59-62. Consequently, it was initially designed to transmit a requested resource, such as a web page or some other file, “entirely in one piece to the destination appliances.” *Id.* at 2:14-18. Prior to the development of the claimed invention, the HTTP GET method had been extended to allow a resource to be transmitted in parts, or “chunks.” *Id.* at 2:18-19, 22-23. This extension was intended for circumstances in which it is

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<sup>5</sup> The '828 Patent also contains an independent claim for a source appliance. '828 Patent at 8:63-9:17. Nonetheless, because this Opinion and Order will consider only claim one of the '828 Patent, *see supra* note 1, this summary explains only the method that is claimed in claim one.

not known at the start of the transmission how much data will ultimately be transmitted. *Id.* at 2:20-22. For example, when a user begins to play a video, the user ordinarily need not specify how much of the video will be played, and thus any transmission of audiovisual data over the network must begin even though it has not been specified how much audiovisual data will ultimately be transmitted. In this extension of the HTTP GET method, the resource is transmitted continuously to avoid any gaps during playback. *Id.* at 2:22-24.

The '828 Patent aims “to extend the transport mechanism based on the HTTP-GET method such that it is also possible to implement so-called trick modes in the transmission of data streams.” *Id.* at 2:29-32. Trick modes differ from normal video display primarily in that trick modes, unlike normal video display, do not display all the recorded video frames in chronological order—“for example only individual video frames are reproduced during a fast forward search through a video film, and other video frames between the reproduced frames are suppressed.” *Id.* at 2:40-43. Consequently, when a user attempts to use a trick mode in displaying a video stored elsewhere on a network, the transmission need include “only [the] individual data blocks [that] are required for the playback process in trick modes.” *Id.* at 2:39-40. The invention disclosed in the '828 Patent modifies the HTTP GET method so that it transmits only the limited data necessary for a video to be displayed in a trick mode. In particular, it does so by “defining additional parameters for the HTTP GET method which, for example, relate to the playback speed and playback direction, as well as to the initial position for the playback process.” *Id.* at 2:35-38. And because these additional parameters specify which portions of the video are required by a given trick mode, when the modified HTTP GET method is employed to request data across the network, “[t]he source device sends the requested data sections for the requested trick mode back with a HTTP Get response.” *Id.* at 2:50-52.

This process is claimed in claim one of the '828 Patent, which reads in full as follows:

A method for discontinuous transmission, in sections, of encoded video data in a network of distributed appliances, the method comprising the following steps:

creation of an HTTP GET request for requesting a fast search operation of an original video stream, the request stating a playback speed parameter and an initial position and optionally at least one parameter selected from a group of parameters consisting of file name, file type, path, and playback direction;

transmission of the HTTP GET request to a source appliance; and

discontinuous transmission, in sections, of selected video frames of an original encoded video stream from the source appliance to a destination appliance in a HTTP response using an extended HTTP chunked transfer encoding mode, in which the selected encoded video frames for the fast search operation are transported in respective chunks, wherein each chunk includes one complete respective selected encoded video frame in a second part and information about a starting time, as located in the original encoded video stream, of the respective selected video frame in a first part, wherein the second part is different from the first part and the information about a starting time of the respective selected video frame being positioned in a commentary line of the first part.

*Id.* at 8:18-43.

## **B. Procedural History**

Plaintiff filed the Complaint that initiated this action on December 29, 2021. Dkt. 1. After Defendant filed a pre-motion letter seeking leave to move to dismiss the Complaint, Dkt. 19, Plaintiff sought leave to amend the Complaint to include additional allegations related to the subject matter claimed by the Asserted Patents, Dkt. 20, which the Court granted, Dkt. 21. On June 7, 2022, Plaintiff filed the Amended Complaint, Dkt. 22, which Defendant then moved to dismiss on July 11, 2022, Dkts. 26, 27 (“Motion”). Plaintiff opposed that motion on August 8, 2022, Dkt. 28, and Defendant replied on August 15, 2022, Dkt. 29.

## II. Legal Standards

### A. Motion to Dismiss

To survive a motion to dismiss for failure to state a claim, “a complaint must contain sufficient factual matter, accepted as true, to ‘state a claim to relief that is plausible on its face.’” *Ashcroft v. Iqbal*, 556 U.S. 662, 678 (2009) (quoting *Bell Atl. Corp. v. Twombly*, 550 U.S. 544, 570 (2007)). A claim is plausible “when the plaintiff pleads factual content that allows the court to draw the reasonable inference that the defendant is liable for the misconduct alleged.” *Id.* A complaint’s “[f]actual allegations must be enough to raise a right to relief above the speculative level.” *Twombly*, 550 U.S. at 555. Although the Court must “accept[] as true the factual allegations in the complaint and draw[] all inferences in the plaintiff’s favor,” *Biro v. Condé Nast*, 807 F.3d 541, 544 (2d Cir. 2015), it need not “accept as true legal conclusions couched as factual allegations,” *LaFaro v. N.Y. Cardiothoracic Grp., PLLC*, 570 F.3d 471, 475-76 (2d Cir. 2009).

### B. Patent-Eligible Subject Matter

The limits of patentability are set forth in Section 101 of the Patent Act of 1952, Pub L. No. 82-593, 66 Stat. 792, 797, which provides that “any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof” may be patented. 35 U.S.C. § 101. As the Supreme Court has explained, “this provision contains an important implicit exception: Laws of nature, natural phenomena, and abstract ideas are not patentable.” *Alice Corp. v. CLS Bank Intern.*, 573 U.S. 208, 216 (2014) (internal quotation marks omitted). In *Alice*, the Court articulated the two-part test that governs whether a patent claims ineligible subject matter and, therefore, is invalid. Under that test, a court must first “determine whether the claims at issue are directed to a patent-ineligible concept,” such as a law of nature, natural phenomenon, or abstract idea. *Id.* at 218. If so, the court must “examine the elements of the claim to determine whether it contains an inventive concept sufficient to transform the claimed

abstract idea into a patent-eligible application.” *Id.* at 221 (internal quotation marks omitted). To meet this standard, a patent must “include additional features to ensure that the claim is more than a drafting effort designed to monopolize the abstract idea.” *Id.* (internal quotation marks omitted). And in evaluating the patent, the court must “consider the elements of each claim both individually and as an ordered combination to determine whether the additional elements transform the nature of the claim into a patent-eligible application.” *Id.* at 217 (internal quotation marks omitted). Furthermore, because “[p]atent eligibility under 35 U.S.C. § 101 is a question of law, based on underlying factual findings[, i]t may be resolved on a Rule 12(b)(6) motion when there are no factual allegations that, taken as true, prevent resolving the eligibility as a matter of law.” *Uniloc USA, Inc. v. LG Elecs. USA, Inc.*, 957 F.3d 1303, 1307 (Fed. Cir. 2020) (internal quotation marks omitted).

### III. Discussion

As the Federal Circuit has explained, the two stages of the *Alice* test, “are plainly related: not only do many [Federal Circuit] opinions make clear that the two stages involve overlapping scrutiny of the content of the claims, but . . . there can be close questions about when the inquiry should proceed from the first stage to the second.” *Elec. Power Grp., LLC v. Alstom S.A.*, 830 F.3d 1350, 1353 (Fed. Cir. 2016) (citations omitted). Thus, both stages of the *Alice* inquiry often involve similar questions about the content of the patent, with the difference lying in what aspects of the patent the inquiry is directed towards: the Federal Circuit has “described the first-stage inquiry as looking at the ‘focus’ of the claims, their ‘character as a whole,’ and the second-stage inquiry (where reached) as looking more precisely at what the claim elements add—specifically, whether, in the Supreme Court’s terms, they identify an ‘inventive concept’ in the application of the ineligible matter to which . . . the claim is directed.” *Id.* In evaluating Defendant’s motion to dismiss, then, the Court will first analyze the Asserted Claims to determine whether they focus on



abstract ideas. As discussed below, the Court concludes that each Asserted Claim does focus on an abstract idea. The Court therefore then considers the claim elements, both individually and in combination, to determine whether, as a matter of law, they fail to identify an inventive concept that could transform the abstract idea into a patent-eligible application.

#### **A. Step One**

As mentioned, the step one inquiry under *Alice* is distinctive in that it evaluates a patent holistically, considering the overall focus of the challenged claim rather than the particular elements of that claim individually or in combination. A court must therefore “approach[] the Step 1 ‘directed to’ inquiry by asking what the patent asserts to be the focus of the claimed advance over the prior art.” *TecSec, Inc. v. Adobe Inc.*, 978 F.3d 1278, 1292 (Fed. Cir. 2020) (internal quotation marks omitted). Furthermore, courts must be wary of “overgeneralizing claims” in conducting the step one analysis. *Id.* at 1293. “At some level, all inventions embody, use, reflect, rest upon, or apply laws of nature, natural phenomena, or abstract ideas. Thus, an invention is not rendered ineligible for patent simply because it involves an abstract concept.” *Alice*, 573 U.S. at 217 (internal quotation marks and ellipsis omitted). A court would “all but ensure[] that the exceptions to § 101 swallow the rule” by “describing the claims at . . . a high level of abstraction and untethered from the language of the claims.” *Enfish, LLC v. Microsoft Corp.*, 822 F.3d 1327, 1337 (Fed. Cir. 2016). Instead, then, in conducting the *Alice* step one inquiry a court must focus on “the language of the Asserted Claims themselves considered in light of the specification.” *TecSec*, 978 F.3d at 1292 (citations and internal quotation marks omitted).

Claims directed to improvements in computer software are not always “abstract and necessarily analyzed at the second step of *Alice*.” *Enfish*, 822 F.3d at 1335. Rather, “[s]oftware can make patent-eligible improvements to computer technology, and related claims are eligible so long as they are directed to non-abstract improvements to the functionality of a computer or

network platform itself.” *TecSec*, 978 F.3d at 1293 (internal quotation marks omitted). The Federal Circuit has

found claims directed to such eligible matter in a number of cases where [it has] made two inquiries of significance here: whether the focus of the claimed advance is on a solution to a problem specifically arising in the realm of computer networks or computers; and whether the claim is properly characterized as identifying a “specific” improvement in computer capabilities or network functionality, rather than only claiming a desirable result or function.

*Id.* (internal quotation marks and citations omitted). Such claims are directed to eligible subject matter because they “entail[] an unconventional technological solution . . . to a technological problem.” *Amdocs (Israel) Ltd. v. Openet Telecom, Inc.*, 841 F.3d 1288, 1300 (Fed. Cir. 2016). Furthermore, this “analysis at step one must focus on the claim language,” *Hawk Tech. Sys.*, 2023 WL 2054379, at \*6, for “the claim language defines the breadth of each claim,” *ChargePoint, Inc. v. SemaConnect, Inc.*, 920 F.3d 759, 766 (Fed. Cir. 2019). Consequently, “while the specification may help illuminate the true focus of a claim, when analyzing patent eligibility, reliance on the specification must always yield to the claim language in identifying that focus.” *Id.*

The Court concludes that the Asserted Patents are directed to patent-ineligible subject matter based on the second of the two inquiries identified by the Federal Circuit as significant in evaluating software patents—namely, whether the patent claims “a specific improvement in computer capabilities or network functionality, rather than only claiming a desirable result or function.” *TecSec*, 978 F.3d at 1293. That inquiry ensures that patentable claims “avoid[] being ‘abstract’ in another sense reflected repeatedly in [Federal Circuit] cases (based on a contrast not with ‘physical’ but with ‘concrete’): they [must have] the specificity required to transform a claim from one claiming only a result to one claiming a way of achieving it.” *SAP Am., Inc. v. InvestPic, LLC*, 898 F.3d 1161, 1167 (Fed. Cir. 2018). This requirement “invoke[es] an important common-sense distinction between ends sought and particular means of achieving them, between desired results (functions) and particular ways of achieving (performing) them.” *Elec. Power Grp.*, 830

F.3d at 1356. As the Honorable William C. Bryson of the Federal Circuit explained, when sitting by designation in the Eastern District of Texas, the requirement is designed to exclude patents that,

although frequently dressed up in the argot of invention, simply describe a problem, announce purely functional steps that purport to solve the problem, and recite standard computer operations to perform some of those steps. . . . [Such patents] represent little more than functional descriptions of objectives, rather than inventive solutions. In addition, because they describe the claimed methods in functional terms, they preempt any subsequent specific solutions to the problem at issue.

*Loyalty Conversion Sys. Corp. v. Am. Airlines, Inc.*, 66 F. Supp. 3d 829, 845 (E.D. Tex. 2014).

Because each of the Asserted Patents likewise describes a problem, then claims functional steps that purport to solve that problem, each is directed to an abstract idea.

### **1. The '752 Patent**

Defendant argues that the focus of the '752 Patent is “the manipulation of data, specifically the extraction and, storage, *i.e.*, recording, of data from a stream.” Motion at 14. In response, Plaintiff correctly notes that “[c]laims directed to specific improvements in computing systems are patent eligible” even when those improvements involve software rather than hardware. Opposition at 9. In particular, Plaintiff argues, “[c]laim 1 of the '752 patent is directed to an improvement in computing technology, permitting the use of trick mode even when digital video is recorded in scrambled form, overcoming the challenge associated with the need for ‘access and fast decoding of these recorded data,’ ‘thus allowing a fast response to the commands of the operator.’” *Id.* at 11 (quoting Am. Compl. ¶ 16, then *id.* ¶ 20). A patent-eligible improvement to software, however, must not only “focus . . . on a solution to a problem specifically arising in the realm of computer networks or computers” but must also “identify[] a ‘specific’ improvement in computer capabilities or network functionality, rather than only claiming a desirable result or function.” *TecSec*, 978 F.3d at 1293 (internal quotation marks omitted). Because the '752 Patent lacks “the specificity required to transform a claim from one claiming only a result to one claiming a way of achieving it,” *SAP Am.*, 898 F.3d at 1167, it fails to meet this requirement.

The '752 Patent seeks to solve the technological problem of displaying a scrambled video recording in a trick mode. The key element of the claim requires “descrambling of said scrambled data of said stream so as to extract therefrom additional data corresponding to information required by at least one function of the special mode or ‘trick mode’ (fast forward, fast rewind, accelerated motion, slow motion, etc.); and recording of these additional data on the recording medium.” ’752 Patent at 6:52-58. Plaintiff insists that this claim is “not directed merely to extracting and recording data” because “[i]t involves ‘additional data corresponding to information required by at least one function of the special mode or trick mode.’” Opposition at 10 (quoting ’752 Patent at 6:53-55). But this language lacks specificity: it does not disclose any specific technological innovation in what data is extracted or how the data is extracted and stored. Instead, the claim merely discloses a process in which the additional data required by a trick mode—whatever it may be—is extracted and stored—in whatever manner—on a recording device. As the Federal Circuit has explained in a similar case, such a claim is “directed to a method of receiving, displaying, converting, storing, and transmitting digital video ‘using result-based functional language,’” *Hawk Tech. Sys.*, 2023 WL 2054379, at \*5, and as a result, it fails *Alice* step one.

In short, to solve the problem that scrambled data is stored in an inaccessible format, the claim merely recites the solution of instead storing the data in an accessible format. Displaying scrambled audiovisual data in a trick mode is challenging precisely because the scrambling of the data makes the specific data required by the trick mode not readily accessible. Thus, the result sought by the claimed invention is for the desired data, which is recorded in scrambled form, to be easily accessible. And it is merely that result—making accessible the data required for the trick mode—that is claimed by the language of the ’752 Patent. To “extract therefrom additional data corresponding to information required by at least one function of the special mode or ‘trick mode . . . ; and record[] . . . these additional data on the recording medium,” ’752 Patent at 6:53-

58, is just to make accessible the data required to display the video in trick mode. Indeed, the Amended Complaint essentially concedes as much, for in alleging that the claim is “directed to technical solutions to technical problems,” it fails to specifically identify those solutions and instead defines them in terms of the results they achieve, as solutions “involved in allowing the use of trick mode when reading audio-video data recorded in scrambled form.” Am. Compl. ¶ 13; *see also* Opposition at 13 (“’752 patent claim 1 improved computer processes by permitting the use of trick mode even when digital video is recorded in scrambled form.”). This claim involves a “desired result[]” rather than a “particular way[] of achieving (performing) [it],” *Elec. Power Grp.*, 830 F.3d at 1356, and therefore is not directed at a specific solution to a technological problem. Instead, the focus of the claim is the more general abstract idea of manipulating and storing data, which is not patent-eligible. *See Hawk Tech. Sys.*, 2023 WL 2054379, at \*5.

The patent-ineligibility of the claim is further supported by a comparison to other patents that the Federal Circuit has evaluated at *Alice* step one. *See Enfish*, 822 F.3d at 1334 (“[B]oth this court and the Supreme Court have found it sufficient to compare claims at issue to those claims already found to be directed to an abstract idea in previous cases.”). In *Adaptive Streaming Inc. v Netflix, Inc.*, 836 F. App’x 900 (Fed. Cir. 2020), the Federal Circuit recently evaluated U.S. Patent No. 7,047,305 (the “’305 Patent”), which, like the ’752 Patent, “relates generally to digital video processing techniques.” *Id.* at 901 (quoting the ’305 Patent at 1:21). The ’305 Patent sought to solve a problem that arises when a device cannot exploit data because of how that data is formatted, *id.* (“[C]ommunication between devices of different types is hindered by the fact that devices use different formats.”), much as the ’752 Patent addressed the problem of using trick modes when displaying audiovisual data recorded in a scrambled format. To solve that problem, the ’305 Patent disclosed a system containing modules and data structures that analyze an incoming visual signal, transcode it based on that analysis into a different format readable by a user’s device, and then

broadcast the signal to that device in the new format, *see id.* at 901-02, much as the '752 Patent disclosed a process for descrambling audiovisual data and subsequently recording the descrambled data. As the Federal Circuit explained in analyzing the '305 Patent under step one of *Alice*, the '305 Patent's claims focus on "the abstract idea of format conversion" rather than on "any specific advance in coding or other techniques for implementing that idea," because "no such specific technique is required" by those claims. *Id.* at 903. Similarly, then, because the '752 Patent does not require any "specific technique" such as a "specific advance in coding or other techniques for implementing," the process claimed focuses on the abstract idea of extracting and recording data.

By contrast, while Plaintiff cites multiple Federal Circuit decisions applying step one of *Alice* to find that a patent is not directed towards an abstract idea, *see* Opposition at 12-13, the patents evaluated in those cases were upheld because they all—unlike the '752 Patent—disclosed specific technological solutions to the technological problems they addressed. *Koninklijke KPN N.V. v. Gemalto M2M GmbH*, 942 F.3d 1143 (Fed. Cir. 2019), held patentable a claim disclosing a method of avoiding "systematic errors" when checking data accuracy, *id.* at 1147, because it "recite[d] a specific implementation of varying the way check data is generated that improves the ability of prior art error detection systems to detect systematic errors," *id.* at 1150. *Visual Memory LLC v. NVIDIA Corp.*, 867 F.3d 1253 (Fed. Cir. 2017), held patentable a claim that disclosed "a 'specific asserted improvement in computer capabilities'—the use of programmable operational characteristics that are configurable based on the type of processor." *Id.* at 1259-60. *Ancora Technologies, Inc. v. HTC America, Inc.*, 908 F.3d 1343 (Fed. Cir. 2018), held patentable a claimed method that "specifically identifies how that functionality improvement is effectuated in an assertedly unexpected way: a structure containing a license record is stored in a particular, modifiable, non-volatile portion of the computer's BIOS, and the structure in that memory location is used for verification by interacting with the distinct computer memory that contains the program

to be verified.” *Id.* at 1348-49. *Data Engine Technologies LLC v. Google LLC*, 906 F.3d 999 (Fed. Cir. 2018), held patentable a claim that solved a “known technological problem in computers in a particular way—by providing a highly intuitive, user-friendly interface with familiar notebook tabs for navigating the three-dimensional worksheet environment.” *Id.* at 1008. *Enfish* upheld a patent whose claims “are not simply directed to *any* form of storing tabular data, but instead are specifically directed to a *self-referential* table for a computer database[,] . . . which functions differently than conventional database structures.” 822 F.3d at 1337. *Finjan, Inc. v. Blue Coat System, Inc.*, 879 F.3d 1299 (Fed. Cir. 2018), held claims patentable because they “recite more than a mere result. Instead, they recite specific steps—generating a security profile that identifies suspicious code and linking it to a downloadable—that accomplish the desired result. Moreover, there is no contention that the only thing disclosed is the result and not an inventive arrangement for accomplishing the result.” *Id.* at 1305-06. *Core Wireless Licensing S.A.R.L. v. LG Electronics, Inc.*, 880 F.3d 1356 (Fed. Cir. 2018), held patentable claims whose “limitations disclose a specific manner of displaying a limited set of information to the user, rather than using conventional user interface methods to display a generic index on a computer.” *Id.* at 1363. Lastly, *SRI International, Inc. v. Cisco Systems, Inc.*, 930 F.3d 1295 (Fed. Cir. 2019), upheld as patentable claims “directed to using a specific technique—using a plurality of network monitors that each analyze specific types of data on the network and integrating reports from the monitors—to solve a technological problem arising in computer networks.” *Id.* at 1303. In each of these cases, the Federal Circuit held that the patent disclosed a specific technological solution to a technological problem, instead of merely providing a generic characterization of a result to be achieved and thereby claiming all methods of solving that problem.

Because claim one of the ’752 Patent, which addresses the problem that scrambled audiovisual data cannot be exploited in trick modes, discloses only the generically characterized

result of extracting and recording audiovisual data so that it may be exploited by trick modes, it is directed to an abstract idea.

## 2. The '828 Patent

Defendants argue that “the focus of claim 1 of the '828 Patent is the core abstract idea of transmitting messages and data corresponding to a video stream from one device to another.” Motion at 15. In response, Plaintiff contends that although claim one may involve this abstract idea, “it is not directed merely to that,” Opposition at 20, and that “because the '828 Patent is directed to an improvement in computing technology, it is not directed to an abstract idea,” *id.* at 23. In particular, Plaintiff argues, “the '828 Patent explains that, using the disclosed and claimed invention, ‘it is possible to send out the new type of HTTP GET request with the additional parameters such as, playback speed and playback direction, as well as the initial position for the playback process. The source device sends the requested data sections for the requested trick mode back with a HTTP Get response.’” *Id.* at 21. As discussed in connection with the '752 Patent, however, to be patent-eligible an improvement in software must not only “focus on a solution to a problem specifically arising in the realm of computer networks or computers” but further must also “identify[] a ‘specific’ improvement in computer capabilities or network functionality, rather than only claiming a desirable result or function.” *TecSec*, 978 F.3d at 1293 (internal quotation marks omitted). And like the '752 Patent, the '828 Patent fails to meet this requirement because it lacks “the specificity required to transform a claim from one claiming only a result to one claiming a way of achieving it.” *SAP Am.*, 898 F.3d at 1167.

The '828 Patent seeks to solve the problem of “extend[ing] the transport mechanism based on the HTTP-GET method such that it is also possible to implement so-called trick modes in the transmission of data streams.” '828 Patent at 2:29-32. The method disclosed in claim one to solve that problem involves multiple steps separately identified in the individual claim elements. First,



an HTTP GET request is created containing certain specific types of information—“a playback speed parameter and an initial position and optionally at least one parameter selected from a group of parameters consisting of file name, file type, path, and playback direction.” ’828 Patent at 8:23-

26. Then, the source appliance, having received that request, transmits the requested video frames

in respective chunks, wherein each chunk includes one complete respective selected encoded video frame in a second part and information about a starting time, as located in the original encoded video stream, of the respective selected video frame in a first part, wherein the second part is different from the first part and the information about a starting time of the respective selected video frame being positioned in a commentary line of the first part.

’828 Patent at 8:34-43. As with claim one of the ’752 Patent, however, this language fails to disclose a specific technological solution to the problem it addresses. Unlike claims whose subject matter is patent-eligible, claim one of the ’828 Patent does not disclose a specific method of solving that problem—say, by identifying specifically how an HTTP GET request may be modified in order to incorporate the additional required parameters, or by reciting a technologically novel type of data transmission that would transmit the particular data required for a trick mode. Instead, the claim recites the desirable function or result of an HTTP GET request that has been modified so as to request the data required to display video in a trick mode.

Such a claim recites a “mere result”—namely, the modified HTTP GET request—without further “recit[ing] specific steps . . . that accomplish the desired result” or “an inventive arrangement for accomplishing the result.” *Finjan*, 879 F.3d at 1305-06. Indeed, when the Amended Complaint characterizes how the ’828 Patent “improves the state of the art regarding the HTTP-Get method,” it does not describe any specific technological innovations but instead identifies only the desired result of “allowing [the HTTP GET method] to be implemented with trick modes of operation.” Am. Compl. ¶ 47. Similarly, the section of Plaintiff’s briefing that attempts to set out a specific focus of the ’828 Patent for purposes of *Alice* step one points only to “a specific technical *benefit* detailed in the specification,” not, as it must, to claim language that

discloses *how* to achieve that benefit.<sup>6</sup> Opposition at 21 (emphasis added). In short, the '828 Patent, which aims to solve the problem that the HTTP GET method does not transmit the information required by a trick mode, discloses only the solution of modifying the HTTP GET method in order to transmit that information. Because this claim involves a “desired result[]” rather than a “particular way[] of achieving (performing) [it],” *Elec. Power Grp.*, 830 F.3d at 1356, it is not directed at a specific solution to a technological problem, and thus the focus of the claim is the more general abstract idea of transmitting audiovisual data, which is not patent-eligible.

The Federal Circuit’s recent decision in *Hawk Technology Systems*, which addressed a patent similarly found to be directed “to the abstract idea of storing and displaying video” on computers, 2023 WL 2054379, at \*5, is instructive as to why the '828 Patent claims patent-ineligible subject matter. The patent invalidated in *Hawk Technology Systems* disclosed “[a] method of viewing, on a remote viewing device of a video surveillance system, multiple simultaneously displayed and stored video images.” *Id.* at \*1 (quoting U.S. Patent No. 10,499,091 (the “’091 Patent”) at 8:31-33). As described in the specification, that method involved transmitting “signals from the cameras . . . at relatively low data rates and variable frame rates via a broadband connection,” which “results in reduced costs to the user, lower memory storage requirements, and the ability to handle a larger monitoring application.” *Id.* (quoting '091 Patent at 5:28-50). In particular, claim one of the '091 Patent recited steps involving the transmission of a request for video images over a network and the subsequent transmission of the requested images to a viewing device, with the manner of transmission and display of the images being determined by three sets of temporal and spatial parameters associated with each image. *Id.* at \*1-2. Thus,

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<sup>6</sup> As mentioned above, Plaintiff’s extensive reliance on the specification rather than the claims of the '828 Patent is misplaced, since “while the specification may help illuminate the true focus of a claim, when analyzing patent eligibility, reliance on the specification must always yield to the claim language in identifying that focus.” *ChargePoint*, 920 F.3d at 766.

like the '828 Patent, the '091 Patent disclosed a method in which certain parameters are defined and then employed to request and transmit audiovisual data.<sup>7</sup> As the Federal Circuit emphasized, the elements recited in the '091 Patent, like those recited in the '828 Patent, merely “require[d] functional results,” such as

“receiving video images,” “digitizing any of the images not already in digital form,” “displaying one or more of the digitized images,” “converting one or more of the video source images into a selected video format,” “storing at least a subset of the converted images,” “providing a communications link,” “receiving . . . a request to receive one or more specific streams of the video images,” “transmitting . . . a version of one or more of the video images,” and “displaying only the one or more requested specific streams of the video images.”

*Id.* at \*5 (quoting '091 Patent at 8:34-9:5). Consequently, although the disclosed method in the '091 Patent did recite an improved function, it “fail[ed] to recite a specific solution to make the alleged improvement . . . ‘concrete’” and therefore “at most recite[d] abstract data manipulation.”

*Id.* at \*6. Similarly, because claim one of the '828 Patent recites only the improvement of allowing trick modes to be requested with the HTTP GET method, without specific steps making concrete how to achieve that improvement, it too is directed to an abstract idea.

By contrast, *Uniloc USA* elucidates what sort of specific solution can make an improvement to data transmission concrete and thereby enable a software patent to survive *Alice* step one. In that case, the Federal Circuit upheld the patentability of a claimed invention directed broadly to communications networks, such as Bluetooth networks, that connect computing

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<sup>7</sup> The '828 Patent does recite that the data should be requested and transmitted using the HTTP GET method in particular, whereas the '091 Patent does not require any particular technical standard to be employed in transmissions. See '828 Patent at 8:21. Nonetheless, the '828 Patent's limitation to a particular technical standard would not change this analysis. The Federal Circuit has held in a similar context that “merely using XML tags—as opposed to other kinds of tags—to build an index is still abstract” if “[t]he claims are not focused on *how* usage of the XML tags alters the database in a way that leads to an improvement in the technology.” *Intellectual Ventures I LLC v. Erie Indem. Co.*, 850 F.3d 1315, 1328 (Fed. Cir. 2017). And since claim one of the '828 Patent simply employs the HTTP GET method without further explaining how the use of the HTTP GET method leads to a technological improvement, its recitation of that method does not shift the focus of its claim to something other than an abstract idea.

devices. 957 F.3d at 1305. In conventional systems, the “primary” device must alternate between sending two different kinds of signals that each serve different functions—namely, permitting a “secondary” device either to join the network or to transmit data—which may cause delays, or latency, because a secondary device cannot act until it receives the right kind of signal. *Id.* The claims asserted in *Uniloc USA* solved this problem: they were “directed to a patent-eligible improvement to computer functionality, namely the reduction of latency experienced by parked secondary stations in communication systems.” *Id.* at 1307. However, the claim did not merely recite the desirable result of reducing this type of latency but rather identified a specific software innovation that achieved reduced latency—namely, reprogramming the primary station to send both sorts of signal simultaneously. *Id.* at 1307-08. And, as the Federal Circuit explained, this concrete improvement in computing technology differentiated the patent in *Uniloc USA* from other invalid patents that “merely recited a series of abstract steps (‘converting,’ ‘routing,’ ‘controlling,’ ‘monitoring,’ and ‘accumulating records’) using ‘result-based functional language’ without the means for achieving any purported technological improvement.” *Id.* at 1308. (citation omitted).

Thus, because the ’828 Patent fails to disclose any specific, concrete means for achieving the functional improvement in the HTTP GET method that it claims, it is directed to an abstract idea.

## **B. Step Two**

At *Alice* step two, the inquiry shifts from the overall focus of a claim to “the elements of each claim both individually and as an ordered combination” so that the court may determine whether those elements “transform the nature of the claim into a patent-eligible application.” *Alice*, 573 U.S. at 217 (internal quotation marks omitted). The Supreme Court has described this step “as a search for an inventive concept—*i.e.*, an element or combination of elements that is sufficient to ensure that the patent in practice amounts to significantly more than a patent upon the

ineligible concept itself.” *Id.* at 217-18 (internal quotation marks omitted). This test is satisfied, the Federal Circuit has held, “when the claim limitations involve more than performance of well-understood, routine, and conventional activities previously known to the industry.” *Berkheimer v. HP Inc.*, 881 F.3d 1360, 1367 (Fed. Cir. 2018) (internal quotation marks omitted). Crucially, “an abstract idea is not patentable if it does not provide an inventive solution to a problem *in implementing the idea.*” *Free Stream Media Corp. v. Alphonso Inc.*, 996 F.3d 1355, 1366 (Fed. Cir. 2021) (emphasis added). An inventive concept cannot transform an abstract idea into a patent-eligible application of that idea if “the advance lies entirely in the realm of abstract ideas, with no plausibly alleged innovation in the non-abstract application realm.” *SAP Am.*, 898 F.3d at 1163. Similarly, “[i]f a claim’s only ‘inventive concept’ is the application of an abstract idea using conventional and well-understood techniques, the claim has not been transformed into a patent-eligible application of an abstract idea.” *BSG Tech LLC v. Buyseasons, Inc.*, 899 F.3d 1281, 1290-91 (Fed. Cir. 2018).

As Plaintiff notes, Opposition at 8, “[t]he question of whether a claim element or combination of elements is well-understood, routine and conventional to a skilled artisan in the relevant field is a question of fact.” *Berkheimer*, 881 F.3d at 1368. Furthermore, in deciding a motion to dismiss for failure to state a claim, a court cannot resolve factual disputes but must instead “accept[] as true the factual allegations in the complaint and draw[] all inferences in the plaintiff’s favor.” *Biro*, 807 F.3d at 544. For that reason, the Federal Circuit has held that patentees need only “adequately allege their claims [to] contain inventive concepts” in order to “survive a § 101 eligibility analysis under Rule 12(b)(6).” *Aatrix Software, Inc. v. Green Shades Software, Inc.*, 882 F.3d 1121, 1126-27 (Fed. Cir. 2018). Nonetheless, not “any allegation about inventiveness, wholly divorced from the claims or the specification, defeats a motion to dismiss.” *Cellspin Soft, Inc. v. Fitbit, Inc.*, 927 F.3d 1306, 1317 (Fed. Cir. 2019). Instead, “plausible and

specific factual allegations that aspects of the claims are inventive are sufficient” to defeat a 12(b)(6) motion, “as long as what makes the claims inventive is recited by the claims.” *Id.* By contrast, dismissal is appropriate when all the claim details a patentee identifies “fall into one or both of two categories: they are themselves abstract; or there are no factual allegations from which one could plausibly infer that they are inventive.” *SAP Am.*, 898 F.3d at 1168-69.

The Federal Circuit’s recent decision in *Cellspin Soft*, which also involved a patent directed towards the abstract idea of manipulating data, 927 F.3d at 1315, instructively illustrates how a complaint may adequately allege the existence of an inventive concept in order to survive a motion to dismiss. There, the patentee’s complaint specifically alleged how prior implementations of that abstract idea functioned, *id.* at 1316 (“Cellspin’s amended complaints noted that prior art devices included ‘a capture device with built in mobile wireless Internet.’” (quoting *id.* Joint App’x at 2290)), specifically alleged why those prior implementations were inferior, *id.* (“[T]hese devices were ‘inferior,’ Cellspin alleged, ‘because, especially at the time of the patent priority date . . . the combined apparatus [was] bulky, expensive in terms of hardware, and expensive in terms of requiring a user to purchase an extra and/or separate cellular service for the data capture device.’” (quoting *id.* Joint App’x at 2290)), then specifically “alleged that it was unconventional to separate the steps of capturing and publishing data so that each step would be performed by a different device linked via a wireless, paired connection,” *id.* These detailed allegations concerning both the state of the prior art and the specific limitations sufficed to make plausible the inference that the claim elements reciting those limitations “involve more than performance of well-understood, routine, and conventional activities previously known to the industry.” *Berkheimer*, 881 F.3d at 1367 (internal quotation marks omitted). Consequently, there existed at least a question of fact as to whether the claim recited an inventive concept, which precluded the court from holding the patent invalid on a motion to dismiss. By contrast, neither the Asserted Claims nor the allegations

in the Amended Complaint make plausible the inference that the claim elements, or their ordered combination, “involve more than performance of well-understood, routine, and conventional activities previously known to the industry.” *Id.* (internal quotation marks omitted). The Asserted Patents therefore fail *Alice* step two.

First, claim one of the ’752 Patent does not disclose any inventive application of the abstract idea of reformatting and recording data, instead merely reciting “well-understood, routine, [and] conventional activities previously known to the industry,” *Alice*, 573 U.S. at 225 (brackets and internal quotation marks omitted). The language of the claim, for example, refers generically to “recording,” “descrambling,” or “extract[ing]” data without disclosing any inventive concept in how those techniques are implemented. *See generally* ’752 Patent at 6:49-58. Similarly, while claim one does recite that the data recorded must “correspond[] to information required by at least one function of the special mode or ‘trick mode,’” *id.* at 6:53-55, it provides no specific technical details as to how that correspondence should be implemented or achieved, and thus recites no inventive concept with respect to that correspondence. Such claim limitations merely involve “already available computers, with their already available basic functions, to use as tools in executing the claimed process.” *SAP Am.*, 898 F.3d at 1169-70.

Furthermore, the Amended Complaint contains no “plausible and specific factual allegations that aspects of the claims are inventive.” *Cellspin Soft*, 927 F.3d at 1317. In particular, none of its allegations specifically identify either an inventive concept ostensibly disclosed by the patent or particular limitations recited by the claim that were not “well-understood, routine, [and] conventional activities previously known to the industry.” *Alice*, 573 U.S. at 225 (brackets and internal quotation marks omitted). Instead, to the extent that it does contain allegations related to the inventive concept disclosed by the ’752 Patent, it contains only the conclusory allegations that “the claims of the ’752 patent, including claim 1, were not well-understood, routine, or

conventional activities known to the industry before the priority date of the '752 patent” and that “the claims of the '752 patent, including claim 1, represent a significant advancement over the prior art.” Am. Compl. ¶ 28. Such allegations, merely “legal conclusions couched as factual allegations,” *LaFaro*, 570 F.3d at 476, need not be credited by the Court. Indeed, Plaintiff’s own briefing fails to provide any clear, concrete articulation of the “inventive concept” disclosed by the '752 Patent that was not well-understood, routine, or conventional, *see generally* Opposition at 15-19, instead including only a conclusory reference to “the '752 patent’s discussion of the problems in the art and the disclosed solution to those problems,” *id.* at 16.

Similarly, claim one of the '828 Patent does not disclose any inventive concept in the applications it recites of the abstract idea of transmitting audiovisual data. Instead, the language of the claim merely recites standard, generic activities such as the “creation of an HTTP GET request,” the “transmission of the HTTP GET request,” and the “transmission, in sections, of selected video frames . . . using an extended HTTP chunked transfer encoding mode.” *See generally* '828 Patent at 8:18-43. These “well-understood, routine, [and] conventional activities,” *Alice*, 573 U.S. at 225 (brackets and internal quotation marks omitted), do not constitute an inventive concept. Similarly, though claim one of the '828 Patent does disclose that the chunked HTTP GET transmission should include “one complete respective selected encoded video frame in a second part and information about a starting time . . . of the respective selected video frame in a first part,” '828 Patent at 8:35-39, it recites no technical details whatsoever as to how to implement the inclusion of this information, and thus recites no inventive concept in that respect.

Furthermore, the Amended Complaint’s allegations concerning the '828 Patent, as with those concerning the '752 Patent, merely state that “[t]he claims of the '828 patent, including claim 1, were not well-understood, routine, or conventional activities known to the industry before the priority date of the '828 patent. Rather, the claims of the '828 patent, including claim 1, represent



a significant advancement over the prior art.” Am. Compl. ¶ 54. Here too, there are no specific or concrete allegations as to which elements of the claim or which activities recited therein were not well-understood, routine, or conventional. And absent such supporting factual allegations, the Court need not accept the conclusory assertion that a legal standard has been met. Indeed, Plaintiff’s own briefing does not even clearly and concretely identify any specific inventive concept that might render claim one of the ’828 Patent patent-eligible, *see generally* Opposition at 23-25, at most raising the irrelevant argument that “the ’828 patent discloses specific embodiments for performing the claimed method,” *id.* at 25, with an accompanying citation to the ’828 Patent’s specification rather than to its claim, *id.* Thus, the Amended Complaint and the Asserted Patents do not allege facts sufficient to make plausible the inference that the methods disclosed in the Asserted Claims were not well-understood, routine, or conventional.

In its briefing, Plaintiff primarily argues not that specific identified elements recited in the Asserted Claims do, in fact, constitute an inventive concept, but rather that Defendant has failed to produce evidence to show that the recited elements do not constitute an inventive concept. Opposition at 16 (“AccuWeather has put forward no evidence challenging the PTO’s determination that claim 1 of the ’752 patent was allowable over the prior art. It just asks the Court to take its word that the claimed invention is directed to conventional processes and not to improved computer technology . . . .”); *id.* at 17 (“Equally misplaced is AccuWeather’s assertion that ‘the [Amended Complaint] does not identify any specific elements recited in claim 1 of the ’752 patent . . . that were not well understood, routine, or conventional.’ First, this improperly attempts to shift the burden of proving validity to Diatek, when it is AccuWeather’s burden to prove ineligibility by clear and convincing evidence.”); *id.* at 25 (“AccuWeather has put forward no evidence that the PTO erred in concluding that the claims of the ’828 patent are novel and non-obvious over the art of record. Thus, it is AccuWeather’s assertions that are conclusory.”).

Plaintiff is correct that, were the Court required to weigh evidence to determine whether the Asserted Claims recite an activity that was not well-understood, routine, or conventional, the burden of proof would rest on Defendant, 35 U.S.C. § 282(a), and clear and convincing evidence would be required, *Berkheimer*, 881 F.3d at 1368. But considerations related to the burden and standard of proof bear only on the resolution of factual disputes, not on the application of law to facts. *See Microsoft Corp. v. i4i Ltd. P'ship*, 564 U.S. 91, 114-15 (2011) (Breyer, J., concurring). Thus, unless a plaintiff adequately pleads the existence of a factual dispute, a court may decide patent eligibility as a matter of law: in circumstances where “there are no factual allegations from which one could plausibly infer that [claim details] are inventive,” the Federal Circuit has been clear that “judgment on the pleadings that the claims recite no ‘inventive concept’ is proper.” *SAP Am.*, 898 F.3d at 1169.<sup>8</sup> Since the Amended Complaint contains no such allegations, the Court concludes that the Asserted Claims recite no inventive concept, that they therefore fail *Alice* step two, and that they claim subject matter not eligible to be patented.

### C. Leave to Amend

Lastly, the Court considers whether to grant leave to amend. Under Rule 15(a) of the Federal Rules of Civil Procedure, a court “should freely give leave when justice so requires.” Fed. R. Civ. P. 15(a)(2). Plaintiff has not asked the Court for leave to amend its Amended Complaint. “But even when a party does not ask for leave to amend, the Court may grant leave to amend *sua sponte*.” *In re Garrett Motion Inc. Sec. Litig.*, No. 20 Civ. 7992 (JPC), 2022 WL 976269, at \*18 (S.D.N.Y. Mar. 31, 2022) (citation and internal quotation marks omitted) (collecting cases). When deciding whether to *sua sponte* grant leave to amend, “courts will consider many factors, including undue delay, bad faith or dilatory motive, repeated failure to cure deficiencies, undue prejudice to

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<sup>8</sup> The appeal in *SAP America* was taken from a judgment on the pleadings rather than a judgment granting a motion to dismiss, but in reviewing that judgment the Federal Circuit employed the same standard that would govern a motion to dismiss. 898 F.3d at 1166.


the opposing party, and futility.” *Morales v. Kimberly-Clark Corp.*, No. 18 Civ. 7401 (NSR), 2020 WL 2766050, at \*9 (S.D.N.Y. May 27, 2020) (citation omitted). After considering these factors, the Court will grant Plaintiff leave to file a Second Amended Complaint, in the event that Plaintiff believes it can plead facts that would make plausible the inference that the activities recited in at least one of the Asserted Claims were not well-understood, routine, or conventional. With discovery not having yet commenced, this case “is still in its infancy, [so] there would be minimal prejudice to Defendant[s]” in granting leave to amend. *Id.* at \*10. Furthermore, while Plaintiff has already amended the Complaint once, that amendment occurred before the Court’s discussion, in this Opinion and Order, of the sort of allegations that would be required for Plaintiff to defeat a motion to dismiss. The Court emphasizes, however, that Plaintiff should amend only if it can overcome the pleading deficiencies outlined in this Opinion and Order.

#### IV. Conclusion

For the reasons stated above, Defendant’s motion to dismiss the Amended Complaint, Dkt. 26, is granted. In the event Plaintiff decides to amend the Amended Complaint, it must file its second amended complaint within thirty days of this Opinion and Order. If Plaintiff fails to file a second amended complaint within thirty days, and does not show good cause to excuse the failure to do so, the Court will dismiss this action with prejudice and will close the case.

SO ORDERED.

Dated: March 24, 2023  
New York, New York

  
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JOHN P. CRONAN  
United States District Judge